

**Claims**

1. A method of sealing a foil cap to the opening of a container comprising the following steps:

providing a sealing head assembly having an air-cooled inductor disposed adjacent  
5 to a magnetic flux concentrator;

providing an ac current to the air-cooled inductor from a power supply located  
remotely from the sealing head assembly to generate a magnetic field in the air-cooled  
inductor, the magnetic field creating heat primarily in the non-water cooled, air-cooled  
inductor and the magnetic flux concentrator; and

10 transferring the heat from the sealing head assembly by a non-forced air  
convection means.

2. The method of claim 1 wherein the step of transferring the heat further comprises:

placing an at least one evaporator element of a heat pipe in contact with the  
magnetic flux concentrator; and

15 transferring heat from the at least one evaporator element to an at least one  
condenser element of the heat pipe, whereby the heat is transferred from the sealing head  
assembly to an ambient medium surrounding the at least one condenser element.

3. The method of claim 1 wherein the step of transferring heat further comprises:

20 placing a thermally conductive material in contact with the magnetic flux  
concentrator;

placing an at least one evaporator element of a heat pipe in contact with the  
thermally conductive material; and

25 transferring heat from the at least one evaporator element to an at least one  
condenser element of the heat pipe, whereby the heat is transferred from the sealing head  
assembly to an ambient medium surrounding the at least one condenser element.

4. A method of sealing a foil cap to the opening of a container comprising the following  
steps:

providing a sealing head assembly having an air-cooled inductor disposed adjacent  
to a magnetic flux concentrator;

30 providing an ac current to the air-cooled inductor from a power supply located  
remotely from the sealing head assembly to generate a magnetic field in the air-cooled  
inductor, the magnetic field creating heat primarily in the non-water cooled, air-cooled  
inductor and the magnetic flux concentrator;

placing an at least one evaporator element of a heat pipe in contact with the magnetic flux concentrator; and

transferring heat from the at least one evaporator element to an at least one condenser element of the heat pipe, whereby the heat is transferred from the sealing head assembly to an ambient medium surrounding the at least one condenser element.

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5. A method of sealing a foil cap to the opening of a container comprising the following steps:

providing a sealing head assembly having an air-cooled inductor disposed adjacent to a magnetic flux concentrator;

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providing an ac current to the air-cooled inductor from a power supply located remotely from the sealing head assembly to generate a magnetic field in the air-cooled inductor, the magnetic field creating heat primarily in the non-water cooled, air-cooled inductor and the magnetic flux concentrator;

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placing a thermally conductive material in contact with the magnetic flux concentrator;

placing an at least one evaporator element of a heat pipe in contact with the thermally conductive material; and

transferring heat from the at least one evaporator element to an at least one condenser element of the heat pipe, whereby the heat is transferred from the sealing head assembly to an ambient medium surrounding the at least one condenser element.

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